



A DESCRIPTIVE STUDY TO ASSESS THE DEPRESSION, ANXIETY AND STRESS OF COVID-19 AMONG NURSING STUDENTS IN SELECTED COLLEGE AT VIRUDHUNAGAR

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ABSTRACT

Covid-19 outbreak has affected not only physical health but also mental health and well-being. The rates of mental health symptoms among Chinese general population during the covid-19 pandemic were 27.9% for depression and 31.6% for anxiety. Nursing students may be shunned, harassed and even blamed as potential covid-19 spreaders, though they were an important reserve force against covid-19 and other diseases. Of note, the psychological impact of covid-19 on nursing students remained unclear.

Aim: The aim of the study was to assess the depression, anxiety and stress of covid-19 among nursing students.

Materials and Methods: Non experimental design was used. By using purposive sampling 165 nursing students at the age group of 18-24 years were selected. 21-item Depression Anxiety and Stress Scale (DASS-21) was used to assess the depression anxiety and stress among nursing students.

Results: Maximum number of students were in the age group of 19-20 years (44%), Maximum students were in I year 48 (29%), Maximum students were residing at rural areas 74 (45%), Majority of the students 152 (92%) were Hindus, Majority of the students 134 (81%) were living in nuclear family and majority of the students 76 (46%) were have a family income of Rs 10,000/ to Rs 20,000/. From the sample, About depression, majority of the students 114(69%) were not experienced depression. 20(12%), 15(9%), 10(6%) and 6(4%) students were in mild, moderate, severe and extremely severe level of depression respectively. About anxiety, majority of the students 91(55%) were not experienced anxiety. 18(11%), 32(19%), 11(7%) and 13(8%) students were in mild, moderate, severe and extremely severe level of anxiety. About stress, majority of the students 137(83%) were not experienced stress. 13(8%), 11(7%), 4(2%) students were in mild, moderate and severe level of stress and no students were found in extremely severe level of stress.

Conclusion: As Nursing students are an important reserve force against the covid-19 pandemic, special psychological interventions should be implemented to assure their mental health.

KEYWORDS: Depression, Anxiety, Stress, Covid-19, Nursing Students.

INTRODUCTION:

One of the extreme challenges for survival is facing a pandemic of an infectious disease of the COVID-19 type. The World Health Organization (WHO) declared COVID-19 as a pandemic on March 11, 2020 and as on March 24, 2020, more than 3.5 lakhs cases have been confirmed and more than 14,000 deaths have been reported, affecting 190 countries worldwide (WHO website dated March 24, 2020 at 21:00pm Indian standard time) and these figures have exponentially increased to about 27.19 lakhs cases with about 1.9 lakhs death in 1 month time (WHO website date April 25, 2020 at 05:30 pm Indian standard time) [2,6].

Healthcare workers, including nurses, played very important roles in fighting the COVID-19 pandemic and have made invaluable contributions. Many nurses were brave and heroic, working at the frontlines to treat patients with COVID-19 pneumonia despite the very high risk of infection. Frontline nurses, especially women, experienced a large psychological burden which manifested as symptoms of post-traumatic stress disorder (PTSD), depression, anxiety, and insomnia. [1]. Nursing students is an important part to promote the sustainable development of the medical industry. Healthy psychology is important for them to complete their studies and be competent for clinical work. Individual being in quarantine may experience psychological distress in the form of anxiety, confusion and stress symptoms. In addition, many previous studies showed that psychological problem of medical students may affect the choice of medical career and even lead to student's suicide. Currently, several studies have reported nursing student's sleep quality and their stress level before and during lockdown due to the covid-19 pandemic [3].

Compared with non-medical disciplines, nursing studies are characterized by full-time courses, stringent tests, formation of complex interpersonal relationships, and practice in a clinical environment. During nursing education, most nursing students experience moderate to high levels of stress during clinical training. With this, there is a high prevalence of anxiety and depressive symptoms among nursing students. Furthermore, nurses are the leading active partners in primary and secondary infectious disease prevention efforts. During the Covid-19 pandemic, frontline nurses generally work under stress and even put their lives at risk in the course of performing their duties. This is reflected in several studies which reported that nursing students experienced anxiety and depression in the early months of the Covid-19 pandemic. Moreover, nursing stu-

dents are likely to be fearful of being infected by Covid-19 [4].

In India students have left school and college since mid-January 2020 and been quarantined at home became after covid-19 pandemic. To our knowledge, studies regarding depression, anxiety and stress of covid-19 among nursing students in India are still lacking. Therefore, the aim of the present study was to assess the depression, anxiety and stress of covid-19 among nursing students. The findings would contribute to formulate effective interventions on psychological health, so as to improve the mental health level of nursing students.

Aim: The present study aimed at assessing the depression, anxiety and stress of covid-19 among nursing students in selected college at Virudhunagar.

METHODOLOGY:

A quantitative research approach and Non-experimental research design was used to collect data. By using purposive sampling 165 nursing students at the age group of 18-24 years who are studying in V.V.Vanniaperumal nursing college at Virudhunagar were selected. Formal permission was obtained from the college authority and oral consent was obtained from the nursing students.

Tool : Instrument for data collection consisted of two sections.

Section I: Demographic variables such as age, year of study, residence, religion, type of family and family income.

Section II: 21-item Depression Anxiety Stress Scale (DASS-21) was used to assess the depression, anxiety and stress of covid-19 among nursing students.

RESULTS AND DISCUSSION:

Demographic data of the nursing students.

Maximum number of students were in the age group of 19-20 years (44%), Maximum students were in First year 48 (29%), Maximum students were residing at rural areas 74 (45%), Majority of the students 152 (92%) were Hindus, Majority of the students 134 (81%) were living in nuclear family and majority of the students 76 (46%) were have a family income of Rs.10,000/ -Rs 20,000/

Table-1: Distribution of frequency and percentage of depression among nursing students.

N=165

S. No.	Level of Depression	Frequency	Percentage Distribution
1.	Normal	114	69%
2.	Mild	20	12%
3.	Moderate	15	9%
4.	Severe	10	6%
5.	Extremely Severe	6	4%

Among 165 samples of nursing students, 114(69%) students haven't experienced depression, 20(12%) students are in mild level of depression, 15(9%) students are in moderate level of depression, 10(6%) students are in severe level of depression and 6(4%) students are in extremely severe level of depression. (Table-1)

Table 2: Distribution of frequency and percentage of anxiety among nursing students.

N=165

S. No.	Level of Anxiety	Frequency	Percentage Distribution
1.	Normal	91	55%
2.	Mild	18	11%
3.	Moderate	32	19%
4.	Severe	11	7%
5.	Extremely Severe	13	8%

Among 165 samples of nursing students 91(55%) students haven't experienced anxiety, 18(11%) students are in mild level of anxiety, 32(19%) students are in moderate level of anxiety, 11(7%) students are in severe level of anxiety and 13(8%) students are in extremely severe level of anxiety. (Table-2).

Table 3: Distribution of frequency and percentage of stress among nursing students.

N=165

S. No.	Level of Stress	Frequency	Percentage Distribution
1.	Normal	137	83%
2.	Mild	13	8%
3.	Moderate	11	7%
4.	Severe	4	2%
5.	Extremely Severe	0	0%

Among 165 samples of nursing students, 137(83%) students haven't experienced stress, 13(8%) students are in mild level of stress, 11(7%) students are in moderate level of stress, 4(2%) students are in severe level of stress and no students are found in extremely severe level of stress. (Table3).

Table 4: Association of selected demographic variables with depression of covid-19 among nursing students

N=165

S. No.	Demographic Variables	Normal	Mild	Moderate	Severe	Extremely Severe	X
1. Age:							
a)	17-18 Years	17	8	4	1	1	22.87*
b)	19-20 Years	61	2	6	4	0	
c)	21-22 Years	35	9	7	5	5	
d)	23-24 Years	0	0	0	0	0	
2. Year of Study:							
a)	I Year	29	9	7	2	1	109.6*
b)	II Year	38	1	1	0	0	
c)	III Year	25	2	2	4	0	
d)	IV Year	22	8	5	4	5	
3. Residence:							
a)	Urban	45	8	4	3	5	12.93#
b)	Semi urban	23	4	2	1	0	
c)	Rural	46	8	9	6	1	
4. Religion:							
a)	Hindu	104	19	15	10	6	9.606#
b)	Christian	7	1	0	0	0	
c)	Muslim	3	0	0	0	0	

5. Types of Family:

a)	Nuclear family	95	16	10	9	5	17.92*
b)	Joint family	19	4	5	1	1	
c)	Extended family	0	0	0	0	0	

6. Family Income:

a)	Below 10,000/-	44	11	3	4	1	10.98#
b)	10,000-20,000/-	50	6	11	5	4	
c)	More than 20,000/-	20	3	1	1	1	

*Significant at 0.05 level

#Non-significant at 0.05 level

There was a statistically significant association between depression of covid-19 among nursing students with selected demographic variables such as age (22.87*), year of study (109.6*) and types of family (17.92*) at P=0.05 level. It was also evident that there was no significant association between depression of covid-19 among nursing students with selected demographic variables such as residence (12.93#), religion (9.606#) and family income (10.98#) at P=0.05 level. (Table-4)

Table 5: Association of selected demographic variables with anxiety of covid -19 among nursing students

N = 165

S. No.	Demographic Variables	Normal	Mild	Moderate	Severe	Extremely Severe	X
1.	Age:						
	a) 17-18 Years	13	4	10	2	2	25.41*
	b) 19-20 Years	53	6	8	2	4	
	c) 21-22 Years	26	8	14	6	7	
	d) 23-24 Years	0	0	0	0	0	
2.	Year of Study:						
	a) I Year	20	4	16	5	3	49.0*
	b) II Year	36	3	1	0	0	
	c) III Year	22	6	2	0	3	
	d) IV Year	14	5	13	5	7	
3.	Residence:						
	a) Urban	30	7	12	6	5	9.44#
	b) Semi urban	24	2	4	0	1	
	c) Rural	39	9	15	4	7	
4.	Religion:						
	a) Hindu	81	16	32	10	13	8.06#
	b) Christian	8	2	0	0	0	
	c) Muslim	3	0	0	0	0	
5.	Types of Family:						
	a) Nuclear family	80	12	24	6	12	9.29#
	b) Joint family	12	6	8	4	1	
	c) Extended family	0	0	0	0	0	
6.	Family Income:						
	a) Below 10,000/-	42	3	14	1	3	16.79*
	b) 10,000-20,000/-	42	8	12	7	7	
	c) More than 20,000/-	14	3	5	2	2	

*Significant at 0.05 level

#Non-significant at 0.05 level

There will be a statistically significant association between anxiety of covid-19 among nursing students with selected demographic variables such as age (25.41*), year of study (49.0*), family income (16.79*) at P=0.05 level. It also evident that there was no significant association between anxiety of covid-19 among nursing students with selected demographic variables such as residence (9.44#), religion (8.06#), types of family (9.29#) at P=0.05 level.

Table 6: Association of selected demographic variables with stress of covid-19 among nursing students.

N=165

S. No.	Demographic Variables	Normal	Mild	Moderate	Severe	Extremely Severe	X
1.	Age:						
	a) 17-18 Years	13	4	10	2	2	25.41*
	b) 19-20 Years	53	6	8	2	4	
	c) 21-22 Years	26	8	14	6	7	
	d) 23-24 Years	0	0	0	0	0	
2.	Year of Study:						
	a) I Year	38	9	1	0	0	41.8*
	b) II Year	40	0	0	0	0	
	c) III Year	30	2	1	0	0	
	d) IV Year	30	2	9	4	0	
3.	Residence:						
	a) Urban	48	5	5	3	0	12.7#
	b) Semi urban	29	2	0	0	0	
	c) Rural	61	6	5	1	0	
4.	Religion:						
	a) Hindu	123	13	12	4	0	31.5*
	b) Christian	10	0	0	0	0	
	c) Muslim	3	0	0	0	0	
5.	Types of Family:						
	a) Nuclear family	110	10	9	4	0	13.4#
	b) Joint family	26	3	3	0	0	
	c) Extended family	0	0	0	0	0	
6.	Family Income:						
	a) Below 10,000/-	50	14	5	2	0	27.6*
	b) 10,000-20,000/-	55	6	5	2	0	
	c) More than 20,000/-	20	4	2	0	0	

*Significant at 0.05 level

#Non-significant at 0.05 level

There will be a statistically significant association between stress of covid-19 among nursing students with selected demographic variables such as age (25.41*), year of study (41.8*), religion (31.5*), family income (27.6*) at P=0.05 level. It was also evident that there will not be a significant association between stress of covid-19 among nursing students with selected demographic variables such as residence (12.7#), types of family (13.4#) at P=0.05 level.

DISCUSSION:

Cross sectional study was conducted by Karen Wynter et al to assess depression, anxiety and stress among undergraduate nursing and midwifery students during the COVID-19 pandemic. It was an online, self-administered survey. E-mail invitations with a survey link were sent to 2,907 students enrolled in the Bachelor of Nursing, Australia. Depression, anxiety and stress were assessed using the DASS-21. This study revealed that the proportions of students reporting moderate to severe symptoms of depression, anxiety and stress were 48.5%, 37.2% and 40.2% respectively and almost half of participants reported at least moderate symptoms of depression; more than a third reported at least moderate symptoms of anxiety or stress. This study concluded that poor psychological wellbeing can impact students' successful completion of their studies and therefore, has implications for nursing and midwifery workforce recruitment and retention. During and after pandemics, colleges should consider screening undergraduate students not only for anxiety and stress, but also for depression and it helps in further diagnosis or treatment [7].

Another cross sectional study findings which supports the current study findings is anxiety, stress and depression levels among nurses of educational hospitals during covid19 pandemic in Iran which is conducted by Hojjat Sheikhbardsiri et al. The standard Depression, Anxiety and Stress Scale-21 questionnaire was applied to assess the levels of stress, anxiety, and depression in nurse personnel with a census method (n = 403). The study showed that the mean scores of depressions (9.18 ± 4.45), stress (9.62 ± 4.94), and anxiety (10.32 ± 4.85) in nurses were at moderate level. The study concluded that there is a need to plan psychological support programs for improving the mental health of nurses during the COVID-19 pandemic [5].

CONCLUSION:

Stress, Depression and Anxiety are commonly occurring negative affective

states in young adults that can affect learning and success in a professional nursing program. Nurse educators can play a crucial role in ameliorating some sources of psychological distress. Faculty knowledgeable about indicators of distress in students and how to respond sensitively are important tools that can facilitate student access to appropriate resources. Including opportunities for self care and education about stress management and related skills for students to manage the rigors of post-secondary, professional education is warranted. In particular, support for students to develop effective coping strategies is an essential component in this process.

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